The Co-op Spirit

November 1991

A Publication of TechAlliance, a Computer Cooperative

People Helping People with Personal Technology

Six New Macintosh Models

New Tools for Mac Programmers

Cheap Harddrive Solution for Amiga

Beagle Bros. Updates Apple II Products

A BBS Primer and Program Review

Are Software Backup Copies Legal ?

AmigaDOS Release 2 Now Shipping

Is MS-DOS Still " The DOS " ?

Volume 1, Number 9

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The Co-op Spirit is the newsletter of TechAlliance, a non-profit computer cooperative committed to providing members with resources that increase their understanding and enjoyment of personal computers. The co-op provides members with user groups for the Amiga, Apple II Family, Macintosh, and MS-DOS machines. Both beginning and advanced assistance are provided at our various Special Interest Group Meetings. The Kent, Washington office is a resource center for our local members. This newsletter is our official organ and is sent to every member. It consists mostly of contributions from the membership which include industry news, machine-specific articles, and other items of interest.

MEMBERSHIPS: TechAlliance Memberships may be obtained by filling out the form on the inside back cover of this newsletter and mailing it , along with your dues, to TechAlliance. Annual Membership dues are $25.00 per year; $35 per year outside the U.S.

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SUBMISSION DEADLINES: The deadline for articles, news and meeting announcements will be the first day of the prior month. All articles must be submitted on 3-1/2" disk in ASCII format with a hardcopy included (this is the preferred method), or articles may be uploaded in ASCII format to the TechAlliance BBS with a hardcopy submitted by mail. TechAlliance reserves the right to review, edit, delete or accept articles at its discretion.

MEETING SCHEDULES: Please see back cover of newsletter for meeting schedules and times.

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From the President

Thanks so much to those who have stuck with us with your confidence that we can recover our past eminence as a computer co-operative! Since April of this year when we restarted our membership drive, we have received over six hundred renewal notices. This renewal rate averages out to around 100 renewals a month and should be adequate to sustain us as a volunteer organization, assuming we can continue to receive like numbers of renewals for the next six months and beyond. Yes, I am assuming we really will resolve our remaining litigation favorably and with minimal future expense -- we just yesterday (October 23rd) won two more hearing judgements in court -- and no, we don't expect this decision to bear on Apple v. Microsoft, Hewlett-Packard et al (small joke), though I do feel from our experience that the computer community seems hell-bent on offsetting any recession impact that it is experiencing by bankrolling the legal profession to cover some pretty amazing claims and self-protective schemes if you will.

We have been still getting criticism from old members wanting to see the contents of our newsletter return to its CALL A.P.P.L.E. "roots" and from others who have hoped that we could resurrect MacTech Journal. I apologize to those of you who continue to be offended for having this expectation which we have not honored. Nevertheless, our commitment and philosophy have been clear since our name changed to TechAlliance. The reality is that most of you are now multiple computer users and another majority of you have disparate computer operating systems linked electronically or by software utilities such as AppleShare, etc. Our goal then is to provide our membership with information, and particularly to publish member-submitted original articles which complement these realities.

We sincerely resolve that you will get only the best that we have found on the networks and that has been given to us by member submissions. And certainly we will endeavor to continually improve our quality... not just in the newsletter, but in BBS service and in our local SIG support as well. To accomplish these objectives, we rely on your honest comments and critiques; please do tell us how well we are satisfying your expectations. We might not be able to recreate the pages of the past, but we surely don't want to miss out on being in your future!

John Keithly

Editor's notes

If it hasn't appeared obvious already, I must confess that Desktop Publishing is a field in which I'm all but a rank beginner. Indeed, this issue of The Co-op Spirit is the first DTP project I've seen through to completion, such as it is, or at least to a printer's deadline. I hope the articles in this issue will offer you something genuinely useful and informative, whatever your computer type or interest.

As promised, much of what appears in this issue of the Co-op Spirit is news drawn from that nearly-infinite online resource, USENET. I wish to thank Board member Dick Hubert for helping us select relevant and timely material from the dozen-or-so Megabytes of USENET feeds we've recently received.

I especially wish to express appreciation to fellow TechAlliance members who contributed byline articles for this November issue. We could not, in good conscience, have gone to press without you!

Glenn Eddy

HARDDRIVING AN AMIGA ON THE CHEAP

Being the proud owner of an A2000 and an A2088 Bridgeboard, I was delighted to find an article in the February 1991 issue of Amazing Computing, "Sharing Your Amiga Hard Drive With The Bridgeboard" by Gene Rawls, but quickly realized I had "the opposite problem". I'd awakened one fine day to find myself in possession of a 20-Meg ST-506 harddrive, a "generic XT" harddrive controller card, and an Amiga fairly crying out for deliverance from its floppies-and-RAM environment.

To be sure, I could have connected that Microscience harddrive to my Amiga easily enough using a Commodore 2090A controller (I'm not sure which of the third-party Amiga HD controllers handle ST-506 drives), but I had a 1987 Western Digital WD 1002S-WX2 instead. The Bridgeboard booklet describes, with what I thought sufficient detail, a way to create Amiga partitions on a PC-side drive, so a Harddrive On The Cheap became the Challenge Of The Month (approximately).

Low-level formatting, the first step in preparing an ST-506 harddrive, was relatively easy once I found a document (from a BBS - another reason the modem is one of my favorite peripherals!) describing the procedure along with the "anatomy" of the Western Digital controller. This has evidently been a popular item among PC/Compatible hack-ahem, *enthusiasts*, and the more fanatical of these devotees have discovered the art of fine- tuning the WD 1002S-WX2 and a Seagate harddrive for substantial reductions in data seek times. In the process, one "wiz" was kind enough to detail the basic setup of the controller with other drives besides the Seagate, including, as luck would have it, the very Microscience HH-725 I had "inherited" (a friend had purchased it in several pallet lots of government surplus computer gear, some of which he had to leave behind when he moved).

In brief, the low-level format requires using the DEBUG program: open a PC Window with your MS-DOS System (No.1) disk in the 5.25" drive and type> DEBUG [CR] and a "magic number" at the DEBUG prompt (the hyphen) - `G=C800:5 [CR]`. You will see several English-language prompts with (Y)es or (N)o or "Hit RETURN" choices. Most are correctly answered by choosing the defaults given for each. DEBUG in this case serves as a "terminal" for a setup program coded into a ROM chip on the Western Digital controller. Most major-brand harddrive controllers are similarly equipped.

[Note — all references to "MS-DOS" are to version 3.3, which is currently bundled with the A2088 "XT" Bridgeboard.]

The next step requires another MS-DOS utility, FDISK. This program determines how the harddrive will be partitioned for the MS-DOS files it must hold for the PC side's use (remember, the Bridgeboard is a PC clone!). For me, 7.7 Megs, or 225 "cylinders" have proven more than adequate as a Primary DOS (bootable) partition, with room for a wealth of enhancements and utilities that make life with this "other DOS" a bit easier.

Once defined, a partition must be "high level formatted", which is much the same procedure as that which makes a floppy disk usable. Indeed, use the same FORMAT command, following the instructions for Harddrives given in the MS-DOS User Manual. For convenience, you'll want to make this harddrive partition "bootable", so type:

```
FORMAT C: /s/v
```

(you'll be asked to Name the "volume", using up to 11 characters.)

Copy the remaining MS-DOS files onto "C:" from all three of the "Janus 2.0" 5.25-inch floppies (if you still have Janus version 1.0, see your Amiga dealer!), using these commands:

Start with the System (No.1) Disk still in the A: drive and type:

```
XCOPY A: C: /e/s/v
```

Case (capitalization) isn't important here, but the colons, spaces and slashes are.

"Switch" to the Harddrive by typing:

```
C:
```

Go to the directory where XCOPY is now...

```
CD \SYSTEM
```

Swap Disk No.2 into your A: drive, then type

```
XCOPY A: C: /e/s/v
```

Finally, swap to Disk No.3, then one more time...

```
XCOPY A: C: /e/s/v
```

...now put those precious floppies in a safe place!

Once this is done, you may never need to grab a System floppy disk again. The PC side will boot from the harddrive, and given the right "directives" in `AUTOEXEC.BAT` and `CONFIG.SYS`, will look first in `C:` for any MS-DOS system files it needs before, during or after running an application.

This brings up the hardest part of the whole procedure, which is (later) a great worksaver. You'll probably have to use the EDLIN program to create the following two files, and you have my sympathies... follow the "(in)directions" in the MS-DOS manual to the letter. Better still, get a menu-driven text editor (QEdit is a very good Shareware program) or a small wordprocessor that can save a file as "straight ASCII" (Spinnaker's Easy Writer is good, inexpensive, and aptly named) and save your sanity!

Both of these textfiles belong in the Root directory of the harddrive. Their names and contents must be spelled exactly as shown. Note the backslash between the drive-letter colon and the name of each file. Every directory name, even the "unnamed" Root directory of a disk, must be followed or preceded by a backslash, depending on its position in a disk's "tree" (hierarchy).

```
C:\AUTOEXEC.BAT

prompt $p$g
path=\;\janus;\system;\gwbasic
append \system
atime > nul


C:\CONFIG.SYS

buffers=24
files=20
device=system\ansi.sys
device=janus\jdisk.sys
country=001,,system\country.sys
```

These little "batchfiles" are simplified versions of the ones that tell my PC Side where to find MS-DOS when there's no floppydisk in Drive A:. `AUTOEXEC.BAT` is so-called from the fact that the commands in it "automatically executed" every time the PC Side is booted. This one assumes you haven't installed a clock chip on your Bridgeboard either, so it calls the "Janus" utility `ATIME`, which attempts (*usually* successfully) to read the Amiga system clock and set the PC's date and time. The "prompt" command as I've set it here causes the DOS command prompt to always display the current directory. The "path" and "append" commands tell DOS where to find Command and Data files respectively. The `CONFIG.SYS` file sets some parameters and calls "devices", the second of which (`jdisk.sys`) is absolutely necessary in order for the Amiga side to locate and use its partitions on a harddrive that's physically part of the PC side.

Speaking of the Amiga side... ironically, the program which defines harddrive partitions for the Amiga to use is itself another MS-DOS utility; at least it runs from the PC side - ADISK. This tool works very nearly the same way as FDISK, likewise asking the user to define harddrive partitions by the number of "cylinders" they occupy, and likewise requiring that the computer be rebooted after running the program.

I decided to create two Amiga partitions: one using 283 cylinders and yielding 9.1 Megs under AmigaDOS, and another of 100 cylinders, or 3.1 Megs. The first of these is my "Applications" space, which AmigaDOS recognizes as `JH1:` (don't know why a "second partition" appears first); the second is my "System" for AmigaDOS (mostly the contents of a Workbench disk), recognized as `JH0:` (last physical partition, first logical drive... interesting).

Take a look (dir) at your Amiga/Bridgeboard bootdisk's `:devs` directory. If you don't see it there already, you'll need to add a file called `jdisk.device`. This crucial item will be found in the `:devs` directory of the Bridgeboard Amiga disk. If you've used the "PCInstall" procedure to create your Bridgeboard bootdisk, not to worry. If you haven't, now's as good a time as any... and whatever you do, do it to a *copy* of Workbench, using a write-protected copy of the "PCInstall" disk. After using `ADISK`, you'll have to reboot your Amiga anyway, but before you do, this is a good time to make a needed change to your bootdisk's `:s/Startup-Sequence` file. Close the PC Window and fire up your favorite Amiga-side ASCII editor (or use `Ed` if you don't yet have one... ;-).

Following the line containing the single command:

```
BindDrivers
```

insert new lines:

```
RUN SYS:PC/Services/TimeServ
DJMount
RUN SYS:PC/PCDisk
```

and save the whole file back to `df0:s/Startup-Sequence`

Reboot the Amiga, and for now, just `CANCEL` all the pesky System Requesters that will most assuredly pop up as the Workbench loads. You won't need to open a PC window for the "final steps".

High-level formatting each of the Amiga partitions is much like formatting an Amiga floppy. Use the same AmigaDOS "Format" command from a CLI, i.e. `Format drive jh0: name JHsystem` or click the new `JH0:` icon and draw the "Initialize" item from the Workbench Disk menu. Be patient - this will take a while. To Copy your Workbench programs to the formatted "system" partition, open a CLI and enter:

```
Copy df0: to JH0: opt a
```

(or if you've "ARPified" your boot disk,)

```
Copy df0: JH0: all
```

Later, you can add to `JH0:System` and `JH0:c` many of your favorite utilities that would never have fit on a Workbench floppydisk. Place larger applications such as wordprocessors, databases, spreadsheets, raytracers, paint programs, desktop publishers and the like in the larger `JH1:` partition and enjoy a rest from swapping disks to get around from one part of a program to another. A "Janus" harddrive is admittedly not the fastest storage device in the Amiga world, but you'll be amazed by how much faster your machine loads and runs every program, large or small, compared to its behavior running from floppies.

Keep your Amiga/Bridgeboard boot disk handy! a PC-based harddrive cannot (yet?) autoboot the Amiga side the way it does the PC side. And consider eventually adding a "real Amiga con-

troller" with a separate HD all its own. With this combination, the Amiga and Bridgeboard can perform all the more convincingly as "two computers in one box." I plan on doing this when finances permit, and will most likely run a Bulletin Board System from the PC side (many excellent BBS programs run well on even the smallest PC clones), freeing the Amiga side for "power tasks" (like typesetting a newsletter), and the BBS caller from nervewracking system slowdowns.

"One more thing"... another Janus harddrive can be just a ribbon cable away, as the typical PC-compatible controller is almost always equipped to handle two drives. While I await that Amiga-side controller, a second 20-Meg harddrive is serving as a "mirror" backup for the contents of the first (my friend had left behind several surplus harddrives and this was one more that happened to be working - many were kaput), having been treated to the exact same setup routine down to the starting numbers of its three partitions. The second drive appears as `D:` for the PC side, and as `JH2:` and `JH3:` for AmigaDOS. I "refresh" it regularly by using the `COPY` commands of both operating systems. This is no substitute for backing up a harddrive to floppy disks, but it's much quicker, and the "mirror" has saved my data on more than one occasion that I've had too few floppies on which to perform a "real" backup.

The fact that I'm using 20-Meg harddrives is no reason to limit your choice to such small units - I just had none larger. Any ST-506 drive(s) will do, and your partitions can be larger or smaller, and greater in number if you desire. You might even choose another kind of controller and harddrive for your PC side — an RLL (Run Length Limiting) controller card can often utilize an existing "MFM" (Modified Frequency Modulation) harddrive in a way that provides some 30 percent more storage space from the same drive, typically wringing 32 Megs from a drive that offers 20 Megs under MFM. SCSI (Small Computer Systems Interface) "host adapters" for PC/Compatibles are typically less expensive than their Amiga-based counterparts, and a SCSI harddrive is equally compatible with the SCSI adapter of either side, providing you load the drive with the appropriate software for the side that's using it. Two drives connected to a single controller need not be of the same make and model or even the same size; they will need to be of the same type - MFM, RLL or SCSI. Be advised that MS-DOS 3.3 can't create or use partitions larger than 32 Megs (MS-DOS 5.0 can, but it's rather "bulky" for an XT-class machine) and pre-3.3 versions of MS-DOS don't handle multiple partitions well, if at all. AmigaDOS has no such limitations; even running it in this roundabout way, you're free to make as many Amiga partitions as small or as large as your harddrive space permits.

A hardware hacker's note - you'll probably find that most "surplus" MFM harddrives have a "5.25-inch form factor" (the same width, depth and hardware mounting as a 5.25-inch floppy drive), either half-height or full-height. A half-height drive would fit comfortably in the A2000's lower drive bay, but like me, you probably won't want to "sacrifice" the Bridgeboard's 5.25-inch floppy drive, which will later be needed for importing and exporting data, for installing new programs on the PC side, and for backing up the PC partitions of the harddrive(s). My solution involved "stacking" the two Microscience drives (both half-height) in an external case which was also part of that pallet-lot of surplus gear I had acquired. This "shoebox", originally home to a now-defunct full-height tape drive, has a small power supply that's just adequate for the needs of both drives, and a cooling fan which benefits the drives themselves (they get a bit warm with use) as well as the power supply. I've found that it's okay to use "slightly" longer ribbon cables to connect the drives to the controller; since ST-506 data transfer rates are not exactly "warp speed", cable losses are relatively insignificant. I can't overstate the need for a grounded-wrap shield on exposed ribbon cable though... RFI levels could otherwise render your *neighbor's* radio or non-cable TV useless, and make you liable for a stiff fine from the FCC.

So if you've planned ahead for potential business applications by buying an A2000 and a Bridgeboard, you may as well enjoy some savings for a part of your storage needs. "Pre-owned" harddrives such as I've described here are plentiful as many corporate and governmental users have "upgraded" their desktop systems with huge, expensive SCSI and ESDI harddrives. Bigger, faster drives don't make up for inefficient code and massively redundant data, so if you're not bound by certain "house rules", it could be well worth your while to try "harddriving on the cheap". You'll not only save quite a few bucks in your home system's growth process, you'll have some valuable hardware and software experience to take to a PC-based workplace. My year's experience with this "Janus-HD" setup has proven it to be every bit as reliable (a quality I value above speed and sheer volume) as any purely Amiga-based harddrive installation, so even after I add that SCSI adapter and 100-plus-Meg drive to the Amiga side, the "ol' twenties" will stay put!

Glenn Eddy

feeping creaturism

: /fee'ping kree'ch*r-izm/

n. A deliberate spoonerism for {creeping featurism}, meant to imply that the system or program in question has become a misshapen creature of hacks. This term isn't really well defined, but it sounds so neat that most hackers have said or heard it. It is probably reinforced by an image of terminals prowling about in the dark making their customary noises.

One of a thousand-or-so "hacker terms" defined in THE JARGON FILE, Version 2.9.6, dated 16 August 1991. The file is expected to be published as a book in the near future, and a complete copy is available for downloading from the TechAlliance BBS.

Apple and IBM Form New Multimedia Venture

SAN FRANCISCO, California—October 2, 1991—Apple Computer, Inc. and IBM today announced the formation of an independent, joint venture company that will catalyze the development of exciting new multimedia technologies and products. The new company will develop, license, and make available specifications and technologies to promote the exchange of information such as sound, graphics, video, text, and animation across a variety of computing and consumer electronic devices.

The joint venture company intends to license its future specifications to those companies developing multimedia products, including Apple and IBM. Apple and IBM will continue to independently develop and market their own multimedia products. Both companies expect that the technologies and products offered from the joint venture will enhance Apple's and IBM's future multimedia efforts.

Among other activities, the new venture will develop and promote data formats—that are independent of the computer system used—in order to allow developers to concentrate on multimedia applications that will play on a wide variety of platforms from many different vendors.

"We believe that multimedia technology will be the cornerstone for the next generation of computing," said Dr. David Nagel, vice president of Apple's advanced technology group and acting general manager of Apple's consumer products division. "Animation, video, and sound will proliferate throughout new interactive applications in much the same way as graphics and text do today. The new company will provide a basis of technology for the industry to build upon and will prove to be a springboard for exciting new developer innovations across the education, business, home, and entertainment markets."

"Through this joint venture, IBM and Apple will contribute their experience in multimedia computing to aid the growth of this rapidly changing field," said Lucie Fjeldstad, IBM vice president and president of the Multimedia and Education Division. "With this organization, we will be able to more quickly and cost-effectively deliver platform-independent multimedia technologies that will enable multimedia content providers to thrive."

Apple and IBM will contribute resources, as well as license their multimedia technology to the new venture. The new venture's board of directors will be composed of an equal number of Apple and IBM representatives and will name the company's executive staff at a later date. The new company will be headquartered in the San Francisco Bay Area.

Final agreement is subject to closing and government reviews and waiting periods.

Apple Announces Easier Access to Development Tools

BOSTON, Massachusetts—August 6, 1991—Apple Computer, Inc.'s Developer Group today announced easier access to Apple and third-party development tools through APDA , Apple's source for developer tools. Beginning immediately, development customers are no longer required to pay an annual subscription fee to purchase products through APDA, making it easier than ever before to obtain essential development tools and self-help resources.
Also announced was the introduction of a new, easier-to-use product catalog, the APDA Tools Catalog.

Directly serving over 25,000 customers, APDA offers convenient worldwide access to over 300 development tools and resources, including pre-release versions of software and documentation, for anyone interested in development on Apple platforms.

"We want to make it as easy as possible for developers to get the tools they need to create innovative, successful products," said Kirk Loevner, Director of the Apple Developer Group. "By eliminating the subscription fee, developers can now gain access to those tools at no additional cost. In addition, the new APDA Tools Catalog helps developers find the products best suited to their needs."

APDA Annual Subscription Fee Eliminated

Development customers no longer need to pay an annual subscription fee*, which ranged from $20 to $35 depending on location, to purchase products through APDA. To purchase pre-release products through APDA, customers are required to sign an APDA Terms and Conditions form found in the APDA Tools Catalog, which is then kept on file and covers all future pre-release product purchases. APDA is notifying all current customers of the fee elimination and how it affects them, depending on their subscription date. In addition, licensing of APDA products is available through Apple Software Licensing.

"Purchasing development products should be as easy as calling a toll-free number and placing an order—and now it is," said Wendy Tajima, APDA marketing manager.

APDA Tools Catalog Debut

The new APDA Tools Catalog was introduced today, replacing its APDAlog predecessor. Responding to customer feedback, APDA redesigned the catalog's format making it easier to use and navigate. It features over 300 Apple and third-party

development products including technical resources, training products, languages and environments, debuggers, programming libraries, networking and communications tools, reference books, and more.

The 144-page APDA Tools Catalog contains four-color product photographs, screen shots, and detailed product descriptions to help developers select the products best suited to their needs. Product descriptions include system requirements, licensing notes where applicable, and related product listings. Both alphabetical and subject indexes assist in finding products quickly and easily. Customers will receive a complete catalog sourcebook twice a year; quarterly updates between sourcebooks will highlight both new and key products.

Current APDA customers will automatically receive the APDA Tools Catalog this month. New customers may request a complimentary copy by contacting APDA.

Contact APDA for ordering information or to request a free APDA Tools Catalog. In the U.S., call (800) 282-2732; in Canada, call (800) 637-0029; International customers, call (408) 562-3910.

For information regarding licensing APDA products, call Apple Software Licensing at (408) 974-4667.

* The subscription fee elimination applies to customers purchasing directly through APDA in Cupertino, California. Terms and conditions may vary for international developers purchasing through local APDA distribution channels.

Apple IIGS Filing Accessory

AUGUST 1, 1991 - Greenbelt, MD Gary Hayman, a Washington Apple Pi (Apple user group) member, announces the release of THE MAGIC FILE CABINET - a new and exciting additive to AppleWorks 3.0 and the formation of MAGICAL SOFTWARE.

Hayman states that THE MAGIC FILE CABINET can transform any current or existing AppleWorks data base into an unlimited plethora of information which is no longer confined by the formerly limited 30 categories or 79 character category inputs. Reams of written information are now accessible by a simple press of a macro key.

He explains that THE MAGIC FILE CABINET transforms your AppleWorks data bases by "adding buttons" to each record. When these buttons (actually macro key presses) are activated, information related to that data base record "pops" to your screen. The information may be short, long or in any AWP format you want. It could be notes, comments, records, tables, letters — anything that can be written (no graphics other than text graphics). When you are through reading, or writing, a simple button (macro key press) quickly takes you back to your data base.

Hayman foresees teachers using THE MAGIC FILE CABINET for noting comments and information relative to students in their roster data bases. They might even use it for depositing information for tests, lesson plans, schedules, etc. Business people could use it as a phone log, client information file, activity journal, inventory notes, order information, travel compendium, etc. In fact, Hayman reports that one business has already converted to the use of THE MAGIC FILE CABINET and is constantly expounding its virtues. At home, the user could use it as a catch-all free-flowing note file, house inventory, appliance history journal, directions journal, mailing helper, phone call log, etc. Ideas are boundless.

THE MAGIC FILE CABINET works in conjunction with UltraMacros 3.1, which you MUST have installed with your up-to-date AppleWorks 3.0; comes on either a 3.5- or 5.25-inch disk (specify which); and includes necessary task files, directions, tutorial, and many sample files that the user can employ directly or which will give him/her ideas as how to create their own files from existing or new data bases.

The INTRODUCTORY retail price of THE MAGIC FILE CABINET is $15.00 plus $2.00 s/h plus $.85 for Maryland orders only. For further information or to place your order, contact Gary Hayman (MAGICAL SOFTWARE), 8255 Canning Terrace, Greenbelt, Maryland 20770; Phone (301)-345-3230

By the way, you may have seen and enjoyed many of Hayman's programs that were published in Softdisk and UpTime disk magazines throughout the years or read his many articles published in the "Journal of the Washington Apple Pi" or the National AppleWorks Users Group (NAUG) "Forum."

Symantec Announces New Macintosh Development Environments

CUPERTINO, CA — August 6, 1991 Enabling programmers to fully utilize the capabilities and features of System 7, Symantec Corporation (NASDAQ: SYMC) today announced THINK C version 5.0 and THINK Pascal version 4.0, enhanced versions of its popular development environments.

"As the market leader in Macintosh development environments, Symantec provides programmers with strong tools that fully exploit state-of-the-art technology," said Gordon E. Eubanks, Jr., president and chief executive officer. "With support for Apple's System 7 and enhanced object-oriented programming capabilities, THINK C version 5.0 and THINK Pascal version 4.0 are the ideal tools for Macintosh developers."

NEW FEATURES IN THINK C VERSION 5.0

The multi-pass, optimizing compiler and code generator in THINK C version 5.0 have been completely rewritten to produce the most compact, efficient C code on the Macintosh. An optional global optimizer further reduces code size and execution time. THINK C is now 100 percent ANSI conformant; ANSI conforming applications written in THINK C are portable to other platforms.

With THINK C programmers can use the latest System 7 technologies. THINK C runs under System 7 in both 24- and 32-bit modes, with or without virtual memory.

New object-oriented programming (OOP) tools include a class browser that provides a graphical view of a program's classes and makes navigating and editing OOP code easier. The THINK Class Library provides the building blocks for a standard Macintosh user interface such as windows, menus and controls. THINK Class Library enhancements include new classes for dialogues, multi-window documents and System 7 support.

Markers have been added to the THINK C editor for moving more easily through large source files. The integrated source-level debugger remembers breakpoints and data displays between sessions, enabling programmers to keep their place in the program. Other new features include Disassemble and Preprocess commands that allow programmers to view their code in different forms, and the ability to generate link maps during the compile cycle. An increase in the jump table limit now allows THINK C to support large projects.

NEW FEATURES IN THINK PASCAL VERSION 4.0

The THINK Pascal compiler generates the smallest and fastest Pascal code on the Macintosh. Like THINK C, all of the tools in the THINK Pascal environment are completely integrated for fast turnaround. THINK Pascal supports System 7, allowing developers to write programs that use System 7 technologies. THINK Pascal runs under System 7 in both 24- and 32-bit modes, with or without virtual memory and supports the required set of Apple events.

The new Instant Project feature lets programmers create a project with a single command, automatically opening the project document, loading the libraries and opening a source file in the editor.

There is also support for larger projects, including Far Code and multiple segments in any project type, allowing programmers to develop very large applications more quickly. THINK Pascal includes a Pascal version of the enhanced THINK Class Library to provide Macintosh programmers with additional object-oriented programming capabilities.

"Apple is committed to the success of our third-party developers," said Roger Heinen, vice president of Macintosh Software Architecture at Apple Computer, Inc. "We are extremely pleased to see that the two popular development environments for the Macintosh, THINK C and THINK Pascal, now offer complete System 7 support. These products really underscore Symantec's commitment to the thousands of Macintosh programmers who are eager to take full advantage of System 7 to build new and exciting Macintosh applications."

PRICING AND AVAILABILITY

THINK C version 5.0 requires a Macintosh Plus or higher with a minimum of 2 MB of RAM. The debugger requires 2 MB of RAM and MultiFinder. System Software version 6.0 or higher is required. A hard disk is recommended and required for the THINK Class Library. The suggested retail price is $299. Registered users can upgrade for $89.

THINK Pascal version 4.0 requires a Macintosh Plus or higher with a minimum of 1 MB of RAM (2 MB recommended); 4 MB recommended for use with the THINK Class Library or Apple's MacApp. System Software version 6.0 or later is required. A hard disk is recommended and required for the THINK Class Library or MacApp. The suggested retail price is $249. Registered users can upgrade for $69.

THINK C and THINK PASCAL are available now through Symantec's network of retailers. For further information on either product, customers can call 800-441-7234.

New Macintosh Models

Here's what MacWeek had to say about the upcoming Macs:

There are six new models, due to be released on October 21. Three of them are notebooks.

Macintosh Powerbook 100

9" backlit supertwist display

16-MHz low power 68000 processor

20M hard disk; optional external high-density floppy drive

2M RAM

Optional internal modem

5.1 lbs.

2-4 hour battery life

1.8" x 11" x 8.6"

$2,300; $2,500 with external floppy

Macintosh Powerbook 140

10" backlit supertwist display

16-MHz 68030 processor

20M or 40M hard disk and internal high-density floppy drive

2M or 4M RAM

Optional internal modem

6.8 lbs.

2-3 hour battery life

2.25" x 11.25" x 9.3"

$2,900 (2/20); $3,200 (2/40)

Macintosh Powerbook 170

10" backlit active matrix display

25-MHz 68030 processor and 25-MHz 68882 math coprocessor

40M hard disk and internal high-density floppy drive

4M RAM

Internal fax/data modem included

6.8 lbs.

2-3 hour battery life

2.25" x 11.25" x 9.3"

$4,600

Macintosh Classic II

Identical to the Macintosh Classic, except:

16-MHz 68030 processor

40M or 80M hard disk

2M or 4M RAM included

1 ROM/FPU expension slot

$1,900 (2/40); $2,400 (4/80)

Macintosh Quadra 700

8-bit color graphics, expandable to 24-bit on up to 13" monitors

25-MHz 68040 processor

Optional 80M or 160M hard disk

4M RAM; 4 SIMM slots

2 NuBus 90 and 1 PDS expansion slots

$5,800 (with floppy); $6,500 (with 80M hard disk); $7,000 (with 160M hd)

Macintosh Quadra 900

8-bit color graphics, expandable to 24-bit

25-MHz 68040 processor

Optional 160M hard disk

4M RAM; 12 SIMM slots

5 NuBus 90 and 1 PDS expansion slots

$7,500 (with floppy); $8,700 (with 160M hard disk)

The three notebook models are colored black. None of them have built-in support for external monitors, although third-party companies will doubtlessly offer adapters. All three notebooks will include AppleTalk Remote Access, which allows the user to dial into an AppleTalk network via modem.

The Quadra 700 is similar in appearance to the Mac IIcx and IIci. The Quadra 900 was tentatively called the IIex for a while. They boast an improved SCSI controller, supposedly twice as fast as the existing one, and their NuBus 90 slots can transfer data twice as fast as the current NuBus.

The Classic II has double the performance of the Classic, but it has very little room for expansion.

All six new Macs will require System 7.0.1, due to be released with them. All except the Powerbook 100 have 32-bit clean ROMS.

The SE/30, the original Mac Portable, and the LaserWriter IINT and IINTX models are due to be retired. Prices on the IIci and IIfx may be in for a major cut.

Beagle Bros. Updates its TimeOut series of programs for the Apple IIGS

Lee M. Lippert
Tech Alliance Beagle Buddy

September 26, 1991

The following information updates Beagle Bros. Time Out Programs. Files which list the current versions of all the Time Out programs and their sub files, a freeware program called QuickView by Mark Munz, AW3.0 Patcher 1.6, and the latest version of TO.Utilities have been uploaded to the TA-BBS and are also available on disk from me.

Mouse Patch IIc - (Available from the TA-BBS or from me) This patch fixes the problems UltraMacros had with the mouse on the IIc. Randy Brandt, Mark Munz and others have been chasing this problem for two years. Special thanks to Matt Deatherage (The Keeper of General Truths as his business card says) at Apple for locating the problem. Caution!!! don't use this patch on anything but a back-up of UltraMacros and then do not use it on a GS as it disables any keypad macros you may have written.

QuickView - (Available form the TA-BBS or from me) A gift from Mark Munz to the Apple II community. This handy little program can read AppleWorks word processor files. Feel Free to use it and give copies away. User groups can include it on their "Disk of the Month" for

reading text. Commercial vendors should check with Mark Munz before selling QuickView or including copies with their products.

Companion Plus ver 1.03 - This a major revision of the old AW 3.0 Companion and is considered and upgrade not an update. Users must , therefore, upgrade through Beagle, Beagle Buddies can not update owners of AW 3.0 Companion. Users can update their AW 3.0 Companion by sending Beagle Bros.; 6215 Ferris Square, Suite 100; San Diego, CA 92121; their original disk and $23.50. I can of course update users of Companion Plus.

While Companion Plus has all the features of the old AW 3.0 Companion it added some new items. What is probably the most exciting is feature introduces Randy Brandt's INITs. INITs run before Appleworks and TimeOut are loaded, they in effect patch Appleworks on the fly as it is booting. The INIT in Companion Plus loads the Appleworks built-in dictionary on a RAM disk. The possibilities for INITs are great, many things that could not be done under TimeOut can now possibly be accomplised with an INIT.

Companion Plus also has a new application called Date Math. This makes it easy to calculate the number of days, hours,minutes,etc between dates. While seemingly innocuous, Date Math can really be a time saver. Consider a teacher who assigns a project due in ninety days. Well, how many days in this month, the next month and so on. With Date Math you enter the starting date, t enter 90 and quicker than "bada bo bada bing" you have the answer.

TO.Versions - a list of version numbers made using Help Screens and the AWP file source code so you can make changes to suit your needs. (See Listing below.)

TO.Utilities v3.0.2 - There is no substantial change. Utilities will now display version numbers in X.X.X format instead of X.X . Beagle is making a running change to this version and does not routinly update users to this version.

TO.QuickSpell v 3.1 - This fixes a very rare bug which caused the application to claimthe main dictionary was unavaliable when it was indeed configured correctly. The problem seemed to be file related as you could then OA-Q to a different file and run QuickSpell with no problem or use the OA-V in Appleworks 3.0. Since the problem is so obscure users probably do not need to update.

Calendar 1991 - TimeOut calendar for 1991. - A calendar data base with the "moving" holidays adjusted for 1991, thanks to Beagle Tech Kurt. By the way, we do not as a matter of course send updated calendars out to users. Beagle replaces the data base on the disks in the warehouse so a new user should recieve a current year calendar, but after they purchase, it is their responsibility to update their calendar. As A Beagle Buddy I can do this for you.

TO.Countries - A modified TO.AreaCodes (TO.DeskTools II v2.0)with associated data bases built by BBUD Bruce Shanker that has area/country codes for most places in the world; hats off to Bruce for his hard work. There is a notes file with more information. By the way, many USA area codes are changing. If yours is one, drop a note to Beagle Bros. so they can update the USA data base.

SuperForms v1.03 - An updated version of SuperForms that fixes several problems, see the "Notes" file for more details. The SuperForms fonts now have the prefix SF. SuperForms uses non-proportional fonts, users would often complain of the form printing some characters as an open box. This was caused by using a SuperFonts font that did not have the character for such things as a right angle or a grid intersection. When updating users, I will include the new fonts. Dan is still working on this program, so we should have another update in a few months. SuperFonts itself is not new, the changes were made to the "Installer", "Notes" and the addition of "PickFonts".

Text Tools ver 1.3.1 - Mark Munz fixed a couple of minor problems.

AW3.0 Patcher v1.6 - The latest version of the freeware program which fixes some bugs in the AppleWorks 3.0 program. This is an extension of Patcher v1.5 and will be the "last" version.

I have included Beagle's Specification sheets for the various Beagle programs in the upload to the TA-BBS. These files contain significant information on each of the current Beagle programs for the Apple II and Macintosh computers.

If you have any questions on any of these or other items please contact me. I will try to assist or get you to someone who can help.

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insanely great

adj. [Mac community, from Steve Jobs; also BSD UNIX people via Bill Joy] Something so incredibly {elegant} that it is imaginable only to someone possessing the most puissant of {hacker}-natures.

Yet another of the thousand-or-so "Hacker terms" found in THE JARGON FILE. We will publish at least one of these in each issue of The Co-op Spirit for the forseeable future.

-Ed

Bits & Bytes

by Bill Cowell

DOS WORLD

Much has been written about DOS 5.0, Microsoft DOS 5 that is. The other DOS 5.0, from Digital Research, was actually out several months ahead of the Microsoft version. Initial comparisons between DR DOS and Microsoft DOS 5.0 have given the edge to DR DOS. InfoWorld rated DR DOS 7.2 versus 6.8 for M/S DOS. I am using DR DOS and have been quite pleased with it. One of the features that it has, that Microsoft DOS doesn't have, is the ability to select various option during the boot sequence. Any command that you proceeded by a "?" gives you the yes or no option of whether you want to implement it for this session. Now that Novell has bought DR DOS it will be interesting to see how much they promote and support the software. If they choose to aggressively market it, they just might give Microsoft a little competition. It is certainly good enough that it should be a real race. With the loss leader pricing of M/S DOS by Egghead now over, the race should be on a even footing. Just as I was finishing this article I received notice that DR DOS 6.0 would be out in September. Among the addition are the following:

* A file compression to double the storage of your hard drive
* Additional security features
* Fast task switching
* Integrated utilities
* Comprehensive online help/ documentation

Most of the early articles on M/S DOS 5.0 have been very general and not very helpful. If you were having problems, about the only help was in the ReadMe file that comes with the software. This is starting to change. The August issue of the Systems Integration magazine pretty well documented the long list of hardware and software that was having problems with it. The article includes a list of about twenty software programs that have had problems with DOS 5.0. The article also listed nearly a full column of various hardware anomalies. Examples of specific work around for some of these problems were given. One special word of caution; avoid running Chkdsk/F (to fix lost file segments) while in Windows. Several people have managed to trash some of their files by trying this.

The August issue of PC Computing also has a couple of articles on DOS 5. Its been some time since I have had a look at this magazine. I was quite impressed. If you are not currently a subscriber to a pc magazine, this would be a good one to start with. One years subscription is only $15 and if the August issue is typical its more than worth it. With a subscription you also get a disk of DOS helps.

CRACKED WINDOWS GET FIXED

At least two articles were published in August giving more details on the coming Windows 3.1. Name all the things that you disliked about Windows 3.0 and you will find most if not all improved in 3.1. Speed is improved. The file manager will finally be a really useful tool. Truetype with about 13 fonts will be included. This should improve printing and screen fonts, and will give you true WYSIWYG. The dreaded UAE's (Unrecoverable applications errors) may be largely eliminated. A brief speed test by Byte magazine compared version 3.0 with 3.1. 3.1 was run on a 16 MHz 386SX and 3.0 on a 386/33 computer. The new version was considerably faster even on the slower machine. Tools used by software developers are suppose to be improved. This will mean many more Windows programs and improvements to the ones already out.

MERCEDES OF COMPUTERS

There is now a manufacturer that builds a computer the way I think they should be made. Unfortunately, like the Mercedes auto, with excellence you get a high price. Amkly Systems Inc. builds a family of 386 and 486 computers that have included all the technical enhancements that you might desire in a computer. The company is headed by the one of the founders of the AST company. Actually he was head of their technical effort. The story is, he left because he was unsatisfied with the technical direction the company was taking. Both AST and ALR make computers that are modular and upgradable. Unfortunately both have made undesirable technical choices. They both also tend to use proprietary hardware and software more than necessary, which results in expensive upgrades. The Amkly is also modular, but they use first quality but generic components. For instance the RAM is standard 70ns SIMMs. This approach reduces the necessity for high priced proprietary add-ons. Two wing nuts and the case is off. Even the drive systems come in a module. This whole assembly is easily removable. Typical of the forward thinking is the use of a flash ROM for the bios. This means you can upgrade the bios using just company provided software. Each system comes with the most complete set of setup, diagnostic and help software that I have seen. It even includes DOS help. The DOS help appears to be much more complete than that included with DOS 5. The base configuration comes complete with every thing you would expect including even SVGA video on the motherboard. The bad news is the units cost about $700 more than a somewhat equivalent clone PC.

DISK OF THE MONTH

The current generation of printers have excellent font, graphics and even color capability. Unfortunately to use this capability, the software program

you are using, must have the printer drivers necessary to make use of all this capability. One of the promises of Windows was a common environment that should provide this printing support for all programs that run under Windows. For those who have CITIZEN printers this is now true. I just downloaded a Windows printer driver which supports most of the Citizen printers. With this you will be able to make full use of the printers capability when printing from a Windows application. I am now able to use the Windows paint program and print in color. The file is available from the TA BBS, where it is listed as WinDrv.Exe.

MULTIMEDIA

Microsoft's multimedia extensions for Windows should be out about the same time as this article. The release will include what Microsoft calls "applets". These mini applications will allow users to control and edit CD and other multimedia inputs. With the full set of extensions, users will be able to take animation clips from a sample library and add sound. To make use of this capability you will have to either buy a computer with the required hardware included or get a hardware upgrade for your existing computer. These upgrade kits will be about $1000, but should come down in price fairly rapidly as the market develops. One of the software programs that will take advantage of this capability was announced at the Windows meeting in Boston early in August. The program is called Action and was developed by MacroMind Inc. The program will allow you to develop a presentation that ties graphics and text created in the program to external sounds and graphics. The end product is a presentation that includes scenes which can have multiple objects flying around the screen. The program has a VCR-like toolbox that provides play, rewind and other controls similar to what you have on a VCR. The program will list for $495.

WDC 10/91

YOUR OWN BBS

So you have thought of running your own Bulletin Board System (BBS) ...

Here are some answers to questions you may have, and a review of SPITFIRE, a Shareware BBS program that is fairly easy to set up and run.

Let's take 10 basic questions, one at a time.

1. What kind of BBS?

Most BBSes have an area for Messages and an area for Files. If you only want a Message BBS then you don't give access to the file area or don't put any files into the file area. If you want a File BBS then you will probably want to have a Message area as well in order to have users contact you and other users about the types of programs they want. They will want a place to discuss the types of problems they are having with different types of software or hardware related to a program.

2. How many Message Conferences?

The number of conferences you create can become a burden on the SYSOP if the BBS software doesn't maintain them. The message areas can become so large that you can't find your way around in them. SPITFIRE allows 256 message areas to be used and more can be created with the use of DOORS.

3. How many File Areas?

The number of File areas you need depends on your BBS plans. If your BBS is going to have a lot of files you will want to keep separate areas for the various types of files you are going to have. Some file areas are; Games; Database; Operation System Utilities; Programming Languages; Graphics; Word Processing and there are many other areas that you can make a specific File area for. SPITFIRE allows File Areas limited by the size of the disk space. SPITFIRE also allows special access to File Areas through Security Levels. It also will maintain new files uploaded by others.

4. How many Nodes?

This is the number of copies of the BBS that can run at the same time and share common files. The number of nodes you run requires that you have a PC that will run more than one program, or more than one PC in a network. You must have all the hardware necessary to run a multi-node BBS including a modem for each phone line you are going to operate.

5. Are you going to have an OPEN or CLOSED BBS?

An OPEN BBS allows callers who are not in the users file to log on and have use of the BBS. How much use is controlled by the SYSOP.

A CLOSED BBS allows only callers who are in the user file to log on and have access to the Files and/or Message Conferences.

6. What COM ports do you have?

Each modem you are going to connect will need a serial port. If you are using a serial mouse and printer you have already used up two of the four serial ports used by most systems. There is other hardware and software that will allow the use of multiple modems on your system but that is beyond the scope of this article. Generally the BBS will provide support of COM 1 through COM 4.

7. What BAUD Rate(s) will you be using? What BAUD will you not allow?

If you are using a one-line BBS you will only be able to use the maximum Baud rate supported by your modem. If you are using a

multi-node BBS then you could have several different modems with several different Baud rates limited by the highest Baud of each modem. Some BBSes don't allow access by slow speed modems. 300 Baud is considered to be a slow speed modem, but with the popularity of high speed 9600 Baud modems coupled with the dropping cost of 2400 and 9600 Baud modems, 1200 Baud is being considered a slow speed modem. SPITFIRE allows Baud rates up to 19200 Baud.

8. How many users, how much time, etc.

SYSOPs usually can control how many users the system will have, how often a caller can call, how much time a caller is allowed each call, how much time per day a caller is allowed, the amount of files a caller can download, the ratio of upload to downloads as well as compensation for upload. This will vary with each system. SPITFIRE has all of these features.

9. ANSI Graphics Allowed?

If you will allow use of color graphic displays on your system you must be sure ANSI.SYS is loaded. Other considerations are if the users you are going to have will be able to read the colorful and complex screens you will be displaying or will you have wasted several hours creating something that only a few users will see. (Some types of computers do not have support for the full ANSI set). SPITFIRE allows use of either ANSI or the Standard Characters for displays.

10. Will you be using DOORS?

DOORS are third-party programs that allow users to run special programs while logged onto the BBS. Games are the most popular of these DOORS but there are other programs that make use of DOORS including some that allow the use of more messaging areas.

Now that we have a few questions out of the way we can discuss what SPITFIRE 3.0 has to offer.

If you are going to use SPITFIRE 3.0 and want to reference this article during the setup of your BBS, I recommend that the first thing you do is unpack the files on the two disks and print out the documentation for SPITFIRE. The docs are 146 pages long and will take some time to print.

To print the docs, create a subdirectory on the drive you are going to install SPITFIRE on and unpack the files into that subdirectory, then unpack the SF30DOC.ZIP file (PKZIP is used to compress the files) and you will extract the SPITFIRE.DOC file which you can print on your printer connected to LPT1 by using the command "COPY SPITFIRE.DOC > PRN". Read the remainder of this article and you will be ready to start your setup by the time the printing is done.

HARDWARE REQUIREMENTS:

1. IBM or Compatible PC with minimum of 256K RAM.

(Multi-node requires a 386 with a minimum of 2 Megs RAM or a network)

2. A modem - 300, 1200, 2400, 9600 or higher Baud - for each node.

3. A fixed disk (harddrive) is recommended but the system will run with two floppy drives.

4. A phone line for each node.

5. A printer is optional as SPITFIRE logs all activity to disk even when a printer is also used.

AUTOEXEC.BAT file:

This file should contain, in addition to the statements necessary to complete the startup of your system, the following lines:

Add the path to SPITFIRE to your "path" command (C:\SF).

At the end of your autoexec.bat place the following two lines (modify them to reflect your location of SPITFIRE)

```
CD\SF
SF
```

Note: these must be the last two commands in your config.sys.

These lines will insure that your BBS will restart should you have a power failure.

CONFIG.SYS:

These lines should be in your config.sys file;

```
FILES=25
BUFFERS=30
DEVICE=ANSI.SYS
```
(if your BBS will contain Color Graphics)
```
DEVICE=BRK.DRV
```
(or some similar utility, if you will drop to DOS or use DOORS)

Things you should know before you get started:

Modems. SPITFIRE comes with a large number of initialization strings (63) that will work on the most common modems. If your modem is one of those out of the ordinary you will have to try the default string and see if it works and if it does not keep trying until it does.

Three settings in your modem initialization string are particularly important:

S0=0 (don't allow modem to auto-answer; SPITFIRE will answer instead)

V1 (tell modem to send "verbose" result codes; SPITFIRE reads them)

S2=1 (set modem's "Escape"

character to one that can't be typed inadvertently)

These must be correct for SPITFIRE to work properly.

ANSI Color Graphics. Remember that users will look at your fancy color graphics a couple of times and then will usually turn that feature off if possible in order to speed up the system. Callers who are placing a toll call will usually not enable ANSI at all due to the increased time for screens.

SETTING IT UP

Here I will attempt to tell you how to set up the SPITFIRE BBS and get it running with the basic functions and let you make the changes you wish to customize the BBS the way you want it.

The Program comes on two 5.25" (360K) disks or one 3.5" (720K) disk.

We support the 360K disks so that is how I will explain it.

Since a hard disk is recommended I will use that also.

First you must unpack the two files, SF30-1.ZIP and SF30-2.ZIP. To accomplish this you must use PKUNZIP by Phil Katz to decompress the files. Here we assume that you already have PKUNZIP on your PC and in your path or know how to use it. SPITFIRE docs recommendations will be followed for simplicity.

Unpack the files from both disks to the C:\SF subdirectory on your PC. Create it if necessary. The program and files will take approximately a Megabyte of disk space, plus the files and messages that will be uploaded to your system, so allow however much space you can afford.

The defaults for SPITFIRE are Drive C:\SF, 2400 Baud, and use of COM 1. If your PATH or COM Port is different you will have to start SPITFIRE with command line switches or edit the SF.BAT file to reflect your changes or SPITFIRE will not start the first time. Now if your docs are done printing, you can start the program and modify it to work as your BBS.

At the C:\SF prompt type the command "SF" and press the Enter key. SPITFIRE will start and prompt you for answers to several questions. The first time you run SPITFIRE you will need to answer "yes" to all the questions.

During the setup SPITFIRE will create the following files:

SFNODE.DAT, SFSYSTEM.DAT, SFUSERS.DAT, SFUSERS.PTR, SFFAREA.DAT, SFMCONF.DAT, CALLERS.LOG, HEYSYSOP.LOG and SFMSGT01.IDX.

The following Subdirectories will also be created:

DISPLAY, EXTNODE1, MESSAGE and WORK.

EMS (Expanded) Memory will be used if found for SPITFIRE.OVR.

ANSI Graphics will be made available.

Default values for the various security levels and user times will be set.

Paths for WORK, DISPLAY, MESSAGE and SPITFIRE.EXE will be displayed.

You will be prompted for the SYSOP NAME:

If you wish you can exit the setup here by pressing Enter; however when you start SPITFIRE again you will be prompted for the SYSOP NAME: again.

At the SYSOP NAME: prompt enter the real name of the SYStem OPerator. That would be your real name. Do NOT use SYSOP as the name here.

Next you will be prompted for the Name to use for the SYSOP; here you should enter "SYSOP". All messages sent to the SYSOP will be addressed to the name your enter here, and that name is the one you as SYSOP will have to log on with.

Enter your Password, Phone number, City and State/Province and your birth date. Remember your Birthday is what can be used as a second security check for access to the system so be sure you enter it correctly.

SPITFIRE will now attempt to start. If for some reason SPITFIRE cannot find the COM Port indicated it will, after a fairly long pause, display a message indicating a problem and prompt you to continue or not. Choose not to continue, attempt to find the problem, then restart SPITFIRE.

If you get the message "SPITFIRE ready for use at ..." , the system is working and SPITFIRE is operating.

Now you are ready to customize SPITFIRE.

Type Alt+M to Configure your modem, enter the correct initialization string for your modem from the list in Appendix A. Make any other changes you feel you need to here, like maybe setting the answer on number of rings to 1 so SPITFIRE will answer on the first ring. Type Q to Quit to the BBS.

Type Alt+Z then B, change the SYSOP Security Level to 999 and press Enter.

Type M to change the drop-to-DOS Password to your choice, and press Enter. Remember that anyone who knows this password can gain access to your PC and any of its files or programs.

Note: I found that this is one function that didn't seem to work for me. I had to change the security levels of the menus in order to provide security protection to SYSOP status for any level 100 or over.

Type Alt+T to configure the SPITFIRE switches. 300/1200 Baud callers can be restricted here, ANSI Graphics can be selected or removed here and you can add a second password (the user's birthday). See the SPITFIRE docs for more information.

Alt+P tells you the file Paths.

Alt+R is Message Conference configuration.

Alt+F is File Area configuration.

Configuring a Message Conference... Type Alt+R.

As easy a falling off a log. To make a message conference all you need to do is give it a name:

Type "M" and you are prompted for a description; hit Enter when through.

Type "S" will let you change the security level for the Conference.

Type "#" lets you change the Conference Access, that is if you must have the exact security level or the security level or higher to gain access to that Message Conference. It's confusing but you will get the idea when you try it.

"P" toggles Private or Public Conference.

"N" toggles the Net-Mail feature.

There are several other settings that you can select your own choices.

Each of the settings is separate for each conference.

Configuring a File Area... Type Alt+F.

Type "F" to enter he file area description, press Enter.

Type "D" to enter the Download path for files.

Type "U" to enter the Upload path for files.

Type "S" to enter the Security Level.

Type "&" to enter the Area Access Level.

There are other settings you can select your own choices.

In either Message Conferences or File Areas you select the next one to create by hitting the "plus" key (+).

You go back one by hitting the "minus" key (-).

You can edit add or delete these areas from the keyboard or remotely as a SYSOP.

There are several other features in the File area that you may want to select your own choices.

Cleaning up the \SF directory.

SPITFIRE takes care of most of its files when it is set up, however there are a few things you may want to do to clean the directories up a little.

The docs (version 3.0 section 4.0) tell you where each file used in SPITFIRE can reside. All display type files can reside in the \DISPLAY directory. This is where your would put your customized menus, welcome and goodbye files. Each file can be in text (.BBS) or Color Graphic (.CLR). If your system is going to have ANSI available you can create both types of files. If yours won't, SPITFIRE will always default to the menu files in the \SF directory when it cannot find one in the \DISPLAY directory. When looking at the files in section 4.0 you can see which files can be moved into which subdirectories and move the ones you wish.

MENU Files.

SPITFIRE has five files that contain the codes to control access to them. You can use these codes to control access to your BBS (section 4.5). These files end in the .MNU extension and have a certain format that must be followed in order to edit them. See the docs for details.

Daily Limits.

The DAILYLMT.DAT file will allow users with different security levels to have different daily limits, amounts of bytes and some other features. This can be useful if you have a group of users that you want to give more access to.

Here are the different configuration menus and their selections.

Modem Configuration:

Serial Port
COM 1 through 4

Baud Rate
0 to 19200

Initialization String
String

Modem - Error Correction Type
Yes/No

Hardware Data Flow Control
Yes/No

Answer on What Ring
1 to 5

Display result Messages
On/Off

Disconnect Delay
Number of Seconds

Use High Speed Async Routines
Yes/No

SPITFIRE Configuration:

SYSOP User Name
User Selects

SYSOP Security
Number

New User Security
Number

New User Log On Time (first time)
Number of Minutes

No Activity Time Limit
Number of Minutes

Maximum Users
Number

Maximum User Calls Per Day
Number

Number of Callers(to the BBS)
Number

Upload/Download Ratio Prompt
Number

Upload Time Compensation
Number.decimal

Drop to DOS Password
User Selects

BBS Starting Date
User Selects

SYSOP Name (your name)
User Selects

Node Number
Number

Private BBS Security Level
Number

Total Number of Nodes
Number

SPITFIRE Switches:

US Phone Number Style
On/Off

Log On Message Statistics
On/Off

Log On New File Statistics
On/Off

File Description Conversion
On/Off

300 Baud Callers
Allowed/Not Allowed

1200 Baud Callers
Allowed/Not Allowed

Type of BBS
Public/Private

Graphics
ANSI Available/No ANSI

Second Password
One Password/Two Passwords

Direct Screen Writes
Yes/No

Net-Mail Message Base
Yes/No

Multi Node System
Yes/No

SPITFIRE Paths:

External Transfer Protocols
Yes/No

Work Files Path
Displays Path

Message Files Path
Displays Path

Display File Path
Displays Path

External Transfer Path
Displays Path

Overview.

If you are looking for a BBS that is easy to setup and maintain then SPITFIRE will work for you. However there are some drawbacks to the system.

The docs are long and don't explain the operation of some of the features very well for a beginner. The PC that SPITFIRE is running on must have the Keyboard LOCKED in order to keep anyone from looking at your setup files and getting your passwords and raising their security level. SPITFIRE doesn't prevent a user from logging on with the SYStem OPerators name, although the JOKER.DAT file can contain names that you don't want to have access the BBS. All in all the BBS is very good and very easy to use, even for a beginner. You get all that for a registration fee of $70.00 ($75.00 for a 3.5" disk), US funds.

You can contact me on the TechAlliance BBS for more information on this or any other program in the TA Library.

Bob Caldwell 10/91

FidoNet

n. A worldwide hobbyist network of personal computers which exchange mail, discussion groups, and files. Founded in 1984 and originally consisting only of IBM PCs and compatibles, FidoNet now includes such diverse machines as Apple][s, Ataris, Amigas and UNIX systems. Though it is much younger than {USENET}, FidoNet is already (in early 1991) a significant fraction of USENET's size at some 8000 systems.

Another definition from THE JARGON FILE, Version 2.9.6, 16 August 1991.

The TechAlliance BBS, which has recently received some long-needed hardware upgrades and experienced a few "growing pains", will soon become a FidoNet node.

IS IT THE LAW?

By David Brierley, AppleTalk

Courtesy of ACES Bits and Bytes

Reprinted from the newsletter of Appleholics Anonymous, Ventura, CA.

The definitive word on copyrights: Some non-lawyers may be guilty of the fraudulent practice of law (which IS a crime) by telling people that defeating copy protection is illegal. To those people, I suggest reading HOW TO COPYRIGHT SOFTWARE by Attorney M.J. Salone. I quote:

"Under part of the Copyright Act (USC Section 117), the lawful owner of a program has the right to make a backup copy for personal use. If the original copy is transferred, however, the copy must also be transferred with it or destroyed.

"Section 117 also gives the lawful owner of a program the right to create her own derivative work so long as it is for her own personal use. She is completely within her legal rights, as long as she doesn't:

* Copy, distribute, display or perform the work itself for commercial purposes, or
* Sell the derivative copy or give it away."

End of quote.

As you can see, defeating copy protection (i.e. making a derivative work) is legal as long as the deprotected version is not distributed to anyone other than the legitimate owner of an original copy. This does not illegalize the distribution of instructions for deprotection, since these instructions only allow people to make their own derivative work.

On the subject of shrinkwrap licences, I quote again:

"Software publishers often attempt to use a so-called "shrink-wrap license" for the purpose of restricting the rights of the purchaser. If you've bought software over the counter, you'll be familiar with the sort of license that's printed on, or enclosed in, the packaging that says something to the effect that if you break the package seal, you've agreed to the terms of the license, whoch limits your rights to use the software. One common restriction prohibits the modifying of the software in any way, even for your own use. A Federal Court of Appeals struck down a Louisiana statute that authorized this type of provision on the ground that the statute impermissibly conflicted with the U.S. Copyright Act (Vault Corp. v. Quaid Software, 847 F.2d 255, 5th Cir., 1988).

"Another way software publishers try to restrict the user of over-the-counter software is to provide an "update" or "warranty" card with the software. If you sign it, you not only qualify for the warranty protection or update service offered, but simultaneously agree to the terms of the "Software Licensing Agreement" included in the package. This sort of agreement is also not likely to be binding in a court of law.

"The warranty offered is often required by law anyway, and the "updates" are commonly not really updates, but error corrections which, if uncorrected, would justify your requesting a refund, or perhaps even suing the publisher for negligence."

End of quote.

If certain individuals wish to challenge this, I challenge them to put their money where their mouths are, and buy the book. If not, they risk being reported to the American Bar Association, and possibly being sued or charged.

HOW TO COPYRIGHT SOFTWARE, 2nd Ed., 1989 M.J. Salone, Nolo Press, 950 Parker Street, Berkeley, CA 94710 (800) 992-6656

The Other DOS?

This alternate Disk Operating System for PC/Compatible machines may just give stalwart Microsoft a run for its money. This "official word" took the form of a USENET posting from publisher DRI.

-Ed.

Monterey, CA (Sept. 9, 1991) — Digital Research Inc. today introduced DR DOS 6.0, a major upgrade of its advanced, award-winning operating system for IBM Personal Computers and compatibles.

DR DOS 6.0 can load even more code into high memory—freeing up to 628K of main memory. It features the fastest data cache in the industry, on-the-fly file compression that can effectively double the size of a hard disk, and the best security, task-switching and undelete features of any DOS-compatible operating system. These features make DR DOS 6.0 the optimum environment for any DOS, Windows, or network application.

DR DOS 6.0 Component Feature List

MemoryMAX

- 612K TPA with 8088 and LIM 4.0 Hardware Memory
- 628K TPA with C&T NeAT, LeAP, and SCAT 286 chipsets
- 621K TPA with 286 systems and LIM 4.0 Hardware Memory
- 627K TPA with 386/486 systems.
- 727K TPA with monochrome systems.

DiskMAX

- Disk Compression
- Disk Caching
- Disk Defragmentation
- UNFORMAT and Quick Format
- UNDELETE and DELete WATCH maximizes undelete time-window
- Security features (see below)

ViewMAX

- CUA graphical shell
- User-configurable colors

TaskMAX

- 20 tasks can be loaded simultaneously
- Load tasks from command line or ViewMAX
- Task swapping to extended, expanded and disks
- Preload tasks at startup
- Switch tasks from Hot Key or from ViewMAX
- ASCII cut and paste between applications

BatteryMAX (OEMs)

- Power-management and for full ROM-ability.

CONFIG.SYS Configuration

- Device driver loading optional at boot
- Chaining to alternate CONFIG.SYS files
- Comments (without generating errors)
- Keyboard response available to CONFIG.SYS processing
- Keyboard timeouts
- Set values in primary shell's environment table
- Advanced screen manipulation makes CONFIG.SYS menus possible

Security features

- Logins and Passwords
- "Walk-away" keyboard locking
- File and Directory Passwords
- Secure Disk Partitions cannot be bypassed with floppy boot
- READ/WRITE/DELETE File and Directory attributes

  Consistent password security from both command line and ViewMAX

Installation

- Interactive
- Optional configuration
- Online help
- Uninstall

General DR DOS 6.0 Features

- Command Line History built-in
- Command Line Help
- Printable Online Hypertext Documentation
- Appropriate DR DOS 6.0 commands support file lists (@filelist)
- Full-screen editor
- Serial file transfer up to 115K baud
- CURSOR utility for improved LCD visibility
- TOUCH command
- DISKCOPY to an image file on a hard disk

System Requirements

- Minimum 512K RAM required
- Two floppy OR Single floppy and Hard disk

Pricing and Special Programs (1)

- o Free product-lifetime support
- o 60-day money back guarantee
- o Suggested List Price: US $99.00

- o DR DOS upgrade packages:
- o US $9.95 : Users who purchased DRDOS 5 after Aug. 8, 1991
- o US $24.95: Other DRDOS users

Availability around the world

USA

Digital Research, Inc.	Voice: 1-408-649-3896
Monterey, CA	Voice: 1-800-274-4DRI
	Fax: 1-408-649-0750

UK

Digital Research, Ltd.	Voice: (011 44) 635 35304
Newbury, Berkshire	Fax: (011 44) 635 35834

FRANCE

Digital Research, SA	Voice: (011 33) 139 463366
Velizy Cedez, France	Fax: (011 33) 134 651954

GERMANY

Digital Research, Gmbh	Voice: (011 49) 89 927994-0
	Fax: (011 49) 899 17898

JAPAN

Digital Research	Voice: (011 81) 3349 01551
Tokyo, Japan	Fax: (011 81) 3349 05252

TAIWAN

Digital Research	Voice: (011 886 2) 775 3183
Taipei, Taiwan	Fax: (011 886 2) 731 8292

KOREA

Digital Research	Voice: (011 61) 2550 5405
Seoul, Korea	Fax: (011 61) 2550 5466

SINGAPORE

Digital Research	Voice: (011 65) 560 9673
	Fax: (011 65) 560 9023

(1) If outside US, please contact your nearest Digital Research Office for details and pricing.

John "Frotz" Fa'atuai	frotz@dri.com	(email@domain)
Digital Research, Inc.	uunet!drivax!frotz	(bang!email)
c/o MIS Dept.	408/647-6570 or 408/646-6287	(vmail)
80 Garden Court, CompRm	408/649-3896	(phone)
Monterey, CA 93940	408/646-6248	(fax)

New AmigaDOS Ships

WEST CHESTER, PA - October 16, 1991 – AmigaDOS™ Release 2 operating system is now available for the Commodore Amiga 500, Amiga 2000 and Amiga 3000, making all current Amiga series multimedia machines operationally compatible. AmigaDOS Release 2 is very different from the OS 2.0 first shipped with the Amiga 3000. Many additional man-years of effort have been invested to create a polished, stable, compatible, and fully tested operating system that Commodore will build on for the future. Several hundred official beta testers provided feedback, resulting in the best tested, most trouble-free and reliable operating system for the Amiga ever.

According to David J. Archambault, director of business markets, the new AmigaDOS Release 2 is a major step forward in software technology, and is part of Commodore's commitment to keeping the Amiga competitive and focused on the future.

In updating the Amiga operating system, Commodore reworked the look and the functionality of the Workbench™ interface to incorporate new programmer features for configuring the system, including the ability to use a software program even while another is loading and the flexibility to cancel an operation while it's still in progress. In addition, a more sophisticated hard disk backup utility is now provided.

A major new feature of the AmigaDOS Release 2 is the introduction of scalable fonts to the Amiga platform. Now with Agfa Corporation's Intellifont® scaling technology, Amiga users can scale outline fonts on-the-fly. The Amiga's new font management program creates fonts on demand from the Intellifont Scalable Typefaces supplied in the operating system. As a particular point size is generated, it is saved in RAM and remains available to the application until the system is shut down or a new typeface is requested.

Additional features of the new AmigaDOS Release 2, in conjunction with the ECS chip set, include screen resolutions up to 1280 pixels and 400 lines giving the user truer pictures, and smooth operation at MIDI baud rates enhancing the professional musician's artistic flexibility.

Now, with all of the new features of AmigaDOS Release 2, artists, musicians and video producers have access to a super workstation that multitasks music, art and video in one integrated system.

According to Jeff Scherb, vice president of Commodore Applications and Technical Support, the new programmer features allow developers to create powerful applications easily and consistently.

Several upgrade programs are available to current Amiga owners in the US. Amiga 3000 owners who registered for Gold Service will receive a free five-disk set and manual addendum. Non-Gold Service owners can either call Commodore Express at (800) 448-9987 and order this upgrade by using either their VISA or MasterCard, or sending a check for $19.95 plus $3.00 shipping and handling to:

Commodore Business Machines, Inc.
A3000 Disk Upgrade
P.O. Box 18370
Memphis, TN 38181

to receive the five-disk set and manual addendum. The Amiga 3000 AS314 ROM upgrade kit, including a new manual, will be available in November through Authorized Commodore Service Centers for $45.00 MSRP plus installation.

Amiga 500 and Amiga 2000 owners can get the Amiga AS214 upgrade kit, including a new manual and system ROM, for $99.00 MSRP plus installation through Authorized Commodore Service Centers.

Amiga users in Canada can call 1-800-661-AMIGA to get information on the availability of AmigaDOS Release 2.

Following shipment of AmigaDOS Release 2 Enhancer Kits, Commodore will gradually phase the new OS into production units.

Commodore Business Machines, Inc., based in West Chester, PA., manufactures and markets a complete line of computers and peripherals for the business, education, government and consumer markets.

Commodore is a registered trademark of Commodore Electronics Limited. **Amiga** is a registered trademark of Commodore-Amiga Inc. **Amiga 500, Amiga 2000, AmigaDOS** and **Workbench** are trademarks of Commodore-Amiga Inc. **Intellifont** is a registered trademark of Agfa Corporation.

As we seek new memberships and renewals, we are also compiling a membership directory and member-to-member consulting network. To join TechAlliance, renew your membership, or add your name to the member directory or the consulting network, please fill out this form and mail it to:

TechAlliance, 19309 - 68th Ave. S, Suite R-109, Kent, WA 98032.

Thank you for participating in TechAlliance!

Member Application or Renewal

❑ **Renew** my TechAlliance membership for One Year
$25 (U.S.) $35 (all other countries)

Member Number (or "New") _____

❑ Check enclosed ❑ VISA or MasterCard:
Card Number _____
Expiration Date _____
Signature _____

❑ **New** membership (please fill in all the "Database" fields below)

❑ **Yes**, I use the TechAlliance BBS. Please extend my access privileges.

I use the following systems:

❑ Apple II/+/c/e ❑ Apple IIGS ❑ Amiga ❑ Mac ❑ MS-DOS
❑ Windows ❑ UNIX ❑ OS-2 ❑ Other _____

Please place an **X** in each data box below that you want included in the **Member Directory**. Only those areas marked will be published.

Include in Directory Data: (**Database corrections/additions** for Directory and future mailings - see current database info on label)

❑ Name _____
❑ Address _____
❑ City, State, Zip+4 _____
❑ Phone Number (_____)_____-_____

Member-to-Member Consulting Network

❑ **Yes**, I am interested in joining our Member-to-Member Consulting Network and will consult as indicated below:
(B)eginning level users; (I)ntermediate level users; (A)dvanced level users.

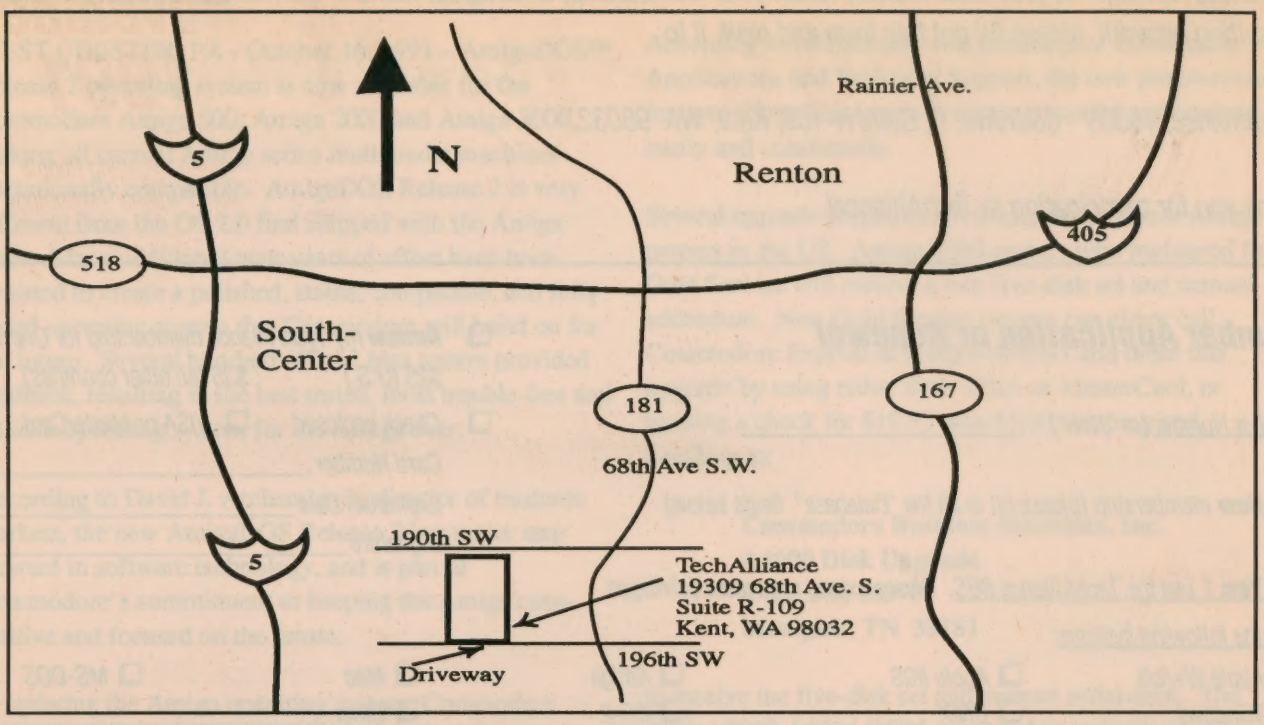
System	Specific Software or Hardware Knowledge (List in priority)	Mark Appropriate Boxes
_____	_____	❑ B ❑ I ❑ A
_____	_____	❑ B ❑ I ❑ A
_____	_____	❑ B ❑ I ❑ A
_____	_____	❑ B ❑ I ❑ A

I prefer to be contacted by:

❑ Phone: (_____)_____-_____ Time Zone _____

Days and hours you will be available: _____

❑ E-mail (TechAlliance BBS) ❑ E-mail (other BBS addresses) _____



November Meeting Schedule

Tues., Nov. 5	**Apple II**	**Tues., Nov. 19**	**Mac Programmers**
Tues., Nov. 12	**Macintosh**	**Tues., Nov. 26**	**MS-DOS**
Wed., Nov. 13	**Amiga**		

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